

In the Claims

1. (Currently Amended) A computerized method comprising:

forming an access unit ~~to update~~corresponding to a fragment of a multimedia description, the access unit being a network transmission data structure comprising a fragment update, the fragment update comprising a fragment update command that specifies a type of command for execution by a decoder to update the multimedia description; and

forming an encoded data stream from the access unit.

2. (Original) The method of claim 1 wherein the fragment update command is selected from the group consisting of add, delete, change, and reset commands.

3. (Previously Amended) The method of claim 1 wherein the fragment update further comprises a value.

4. (Previously Amended) The method of claim 1 wherein the fragment update further comprises a fragment reference wherein the fragment reference is a pointer to a fragment to be used by the fragment update command.

5. (Previously Amended) The method of claim 4 wherein the fragment reference is a uniform resource identifier (URI).

6. (Previously Amended) The method of claim 4 wherein the fragment reference is in XPath.

7. (Original) The method of claim 1 wherein the fragment update further comprises a payload.

8. (Original) The method of claim 4 wherein the fragment is in a first node.

9. (Original) The method of claim 8 wherein the fragment reference is in a second node and the first node and the second node are the same node.
10. (Previously Amended) The method of claim 9 wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.
11. (Original) The method of claim 8 wherein the fragment reference is in a second node and the first node and the second node are different nodes.
12. (Previously Amended) The method of claim 11 wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.
13. (Previously Amended) The method of claim 1 further comprising:
determining if a multimedia description corresponding to the access unit has changed;
identifying a changed portion of the multimedia description and a corresponding access unit; and
forming the fragment update to correspond to the changed portion of the multimedia description.
14. (Original) The method of claim 1 further comprising:
associating the access unit with a partial description.
15. (Original) The method of claim 14 wherein the partial description comprises an instance of a descriptor.
16. (Original) The method of claim 1 further comprising:
associating the access unit with a reset point that contains a fragment that forms a complete description.

17. (Previously Amended) The method of claim 4 wherein the fragment is stored on a different system than a system performing the method of claim 1.

18. (Original) The method of claim 1 wherein the access unit corresponds to a description, and further comprising:

transmitting the encoded data stream while the description is static.

19. (Original) The method of claim 1 wherein the access unit corresponds to a description, and further comprising:

transmitting the encoded data stream while the description is dynamic.

20. (Previously Amended) The method of claim 1 further comprising:

transmitting a data for decoding to a decoder.

21. (Original) The method of claim 20 wherein the data include schemas defining a description data to be transmitted.

22. (Currently Amended) A computerized method comprising:

receiving an access unit ~~to update~~ corresponding to a fragment of a multimedia description, the access unit being a network transmission data structure comprising a fragment update, wherein the fragment update comprises a command and a first fragment reference, and wherein the first fragment reference is a pointer to a first referenced fragment in a first node, and the command specifies a type of command for execution by a decoder to update the multimedia description.

23. (Original) The method of claim 22 wherein the first referenced fragment is a partial description.

24. (Original) The method of claim 22 further comprising:

comparing the first referenced fragment to a stored fragment; and

obtaining the stored fragment if the stored fragment is the first referenced fragment.

25. (Original) The method of claim 22 wherein the first fragment reference is in hyper-text transfer protocol (HTTP).

26. (Previously Amended) The method of claim 22 wherein the access unit is a part of a Moving Picture Expert Group (MPEG) multimedia description.

27. (Original) The method of claim 22 further comprising:

identifying a second node which the command affects; and

identifying a second fragment reference which the first fragment reference points to, wherein the second fragment reference points to the first referenced fragment.

28. (Original) The method of claim 22 wherein the fragment update further comprises a payload.

29. (Original) The method of claim 27, wherein the second fragment reference points to a second referenced fragment within the first node, further comprising:

replacing the first fragment reference with a third fragment reference pointing to the second referenced fragment.

30. (Original) The method of claim 27, wherein the second fragment reference points to a second referenced fragment within the first node, further comprising:

replacing the first fragment reference with a third fragment reference pointing to a third referenced fragment within the second node.

31. (Currently Amended) A computer-readable medium having executable instructions to cause a computer to perform a method comprising:

forming an access unit ~~to update corresponding to a fragment of a multimedia~~ description, the access unit being a network transmission data structure comprising a fragment update, the fragment update comprising a fragment update command that

specifies a type of command for execution by a decoder to update the multimedia description; and

forming an encoded data stream from the access unit.

32. (Previously Presented) The computer-readable medium of claim 31, wherein the fragment update command is selected from the group consisting of add, delete, change, and reset commands.

33. (Previously Presented) The computer-readable medium of claim 31, wherein the fragment update further comprises a value.

34. (Previously Presented) The computer-readable medium of claim 31, wherein the fragment update command further comprises a fragment reference, and wherein the fragment reference is a pointer to a fragment to be used by the fragment update command.

35. (Previously Presented) The computer-readable medium of claim 34, wherein the fragment reference is a uniform resource identifier (URI).

36. (Previously Presented) The computer-readable medium of claim 34, wherein the fragment reference is in XPath.

37. (Previously Presented) The computer-readable medium of claim 34, wherein the fragment is stored on a different computer.

38. (Previously Presented) The computer-readable medium of claim 34, wherein the fragment is in a first node.

39. (Previously Presented) The computer-readable medium of claim 38, wherein the fragment reference is in a second node and the first node and the second node are the same node.

40. (Previously Amended) The computer-readable medium of claim 39, wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.

41. (Previously Presented) The computer-readable medium of claim 38, wherein the fragment reference is in a second node and the first node and the second node are different nodes.

42. (Previously Amended) The computer-readable medium of claim 41, wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.

43. (Previously Presented) The computer-readable medium of claim 31, wherein the fragment update further comprises a payload.

44. (Previously Presented) The computer-readable medium of claim 31, wherein the method further comprises:

determining if a multimedia description corresponding to the access unit has changed;

identifying a changed portion of the multimedia description and a corresponding access unit; and

forming the fragment update to correspond to the changed portion of the multimedia description.

45. (Previously Presented) The computer-readable medium of claim 31, wherein the method further comprises:

associating the access unit with a partial description.

46. (Previously Presented) The computer-readable medium of claim 45, wherein the partial description comprises an instance of a descriptor.

47. (Previously Presented) The computer-readable medium of claim 31, wherein the method further comprises:

associating the access unit with a reset point that contains a fragment that forms a complete description.

48. (Previously Presented) The computer-readable medium of claim 31, wherein the access unit corresponds to a description, and the method further comprises:

transmitting the encoded data stream while the description is static.

49. (Previously Presented) The computer-readable medium of claim 31, wherein the access unit corresponds to a description, and the method further comprises:

transmitting the encoded data stream while the description is dynamic.

50. (Previously Presented) The computer-readable medium of claim 31, wherein the method further comprises:

transmitting a data for decoding to a decoder.

51. (Previously Presented) The computer-readable medium of claim 50, wherein the data include schemas defining a description data to be transmitted.

52. (Currently Amended) A computer-readable medium having executable instruction to cause a computer to perform a method comprising:

receiving an access unit ~~to update~~ corresponding to a fragment of a multimedia description, the access unit being a network transmission data structure comprising a fragment update, wherein the fragment update comprises a command and a first fragment reference, and wherein the first fragment reference is a pointer to a first referenced fragment in a first node and the command specifies a type of command for execution by a decoder to update the multimedia description.

53. (Previously Presented) The computer-readable medium of claim 52, wherein the first referenced fragment is a partial description.

54. (Previously Presented) The computer-readable medium of claim 52, wherein the method further comprises:

comparing the first referenced fragment to a stored fragment; and

obtaining the stored fragment if the stored fragment is the first referenced fragment.

55. (Previously Presented) The computer-readable medium of claim 52, wherein the first fragment reference is in hyper-text transfer protocol (HTTP).

56. (Previously Amended) The computer-readable medium of claim 52, wherein the access unit is a part of a Moving Picture Expert Group (MPEG) multimedia description.

57. (Previously Presented) The computer-readable medium of claim 52, wherein the method further comprises:

identifying a second node which the command affects; and

identifying a second fragment reference which the first fragment reference points to, wherein the second fragment reference points to the first referenced fragment.

58. (Previously Presented) The computer-readable medium of claim 57, wherein the second fragment reference points to a second referenced fragment within the first node, and the method further comprises:

replacing the first fragment reference with a third fragment reference pointing to the second referenced fragment.

59. (Previously Presented) The computer-readable medium of claim 57, wherein the second fragment reference points to a second referenced fragment within the first node, and the method further comprises:

replacing the first fragment reference with a third fragment reference pointing to a third referenced fragment within the second node.

60. (Previously Presented) The computer-readable medium of claim 52, wherein the fragment update further comprises a payload.

61. (Currently Amended) A system comprising:

a processor coupled to a memory through a system bus; and
an encode process executed by the processor from the memory to cause the processor to form an access unit ~~to update~~ corresponding to a fragment of a multimedia description and form an encoded data stream from the access unit, the access unit being a transmission data structure comprising a fragment update, and the fragment update comprising a fragment update command that specifies a type of command for execution by a decoder to update the multimedia description.

62. (Previously Presented) The system of claim 61, wherein the fragment update command is selected from the group consisting of add, delete, change, and reset commands.

63. (Previously Presented) The system of claim 61, wherein the fragment update further comprises a value.

64. (Previously Presented) The system of claim 61, wherein the fragment update further comprises a fragment reference wherein the fragment reference is a pointer to a fragment to be used by the fragment update command.

65. (Previously Presented) The system of claim 61, wherein the fragment reference is a uniform resource identifier (URI).

66. (Previously Presented) The system of claim 61, wherein the fragment reference is in XPath (extensible markup language path language).

67. (Previously Presented) The system of claim 64, wherein the fragment is stored on a different system.

68. (Previously Presented) The system of claim 64, wherein the fragment is in a first node.

69. (Previously Presented) The system of claim 68, wherein the fragment reference is in a second node and the first node and the second node are the same node.

70. (Previously Amended) The system of claim 69, wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.

71. (Previously Presented) The system of claim 68, wherein the fragment reference is in a second node and the first node and the second node are different nodes.

72. (Previously Amended) The system of claim 71, wherein the first node and the second node are in a Moving Picture Experts Group (MPEG) multimedia description.

73. (Previously Presented) The system of claim 61, wherein the fragment update further comprises a payload.

74. (Previously Presented) The system of claim 61, wherein the encode process further causes the processor to determine if a multimedia description corresponding to the access unit has changed, identify a changed portion of the multimedia description and a corresponding access unit, and form the fragment update to correspond to the changed portion of the multimedia description.

75. (Previously Presented) The system of claim 61, wherein the encode process further causes the processor to associate the access unit with a partial description.

76. (Previously Presented) The system of claim 75, wherein the partial description comprises an instance of a descriptor.

77. (Previously Presented) The system of claim 61, wherein the encode process further causes the processor to associate the access unit with a reset point that contains a fragment that forms a complete description.

78. (Previously Presented) The system of claim 61, wherein the access unit corresponds to a description, and the encode process further causes the processor to transmit the encoded data stream through a network interface coupled to the processor through the system bus while the description is static.

79. (Previously Presented) The system of claim 61, wherein the access unit corresponds to a description, and the encode process further causes the processor to transmit the encoded data stream through a network interface coupled to the processor through the system bus while the description is dynamic.

80. (Previously Presented) The system of claim 61, wherein the encode process further causes the processor to transmit a data for decoding to a decode process through a network interface coupled to the processor through the system bus.

81. (Previously Presented) The system of claim 80, wherein the data include schemas defining a description data to be transmitted.

82. (Currently Amended) A system comprising:

- a processor coupled to a memory through a system bus; and
- a decode process executed by the processor from the memory to cause the processor to receive an access unit ~~to update~~ corresponding to a fragment of a multimedia description, the access unit being a network transmission data structure comprising a fragment update, wherein the fragment update comprises a command and a first fragment reference, and wherein the first fragment reference is a pointer to a first referenced fragment in a first node, and the command specifies a type of command for execution by the processor to update the multimedia description.

83. (Previously Presented) The system of claim 82, wherein the first referenced fragment is a partial description.

84. (Previously Presented) The system of claim 82, wherein the decode process further causes the processor to compare the first referenced fragment to a stored fragment, and obtain the stored fragment if the stored fragment is the first referenced fragment.

85. (Previously Presented) The system of claim 82, wherein the first fragment reference is in hyper-text transfer protocol (HTTP).

86. (Previously Amended) The system of claim 82, wherein the access unit is a part of a Moving Picture Expert Group (MPEG) multimedia description.

87. (Previously Presented) The system of claim 82, wherein the decode process further causes the processor to identify a second node which the command affects, and identify a second fragment reference which the first fragment reference points to, wherein the second fragment reference points to the first referenced fragment.

88. (Previously Presented) The system of claim 87, wherein the second fragment reference points to a second referenced fragment within the first node, and the decode process further causes the processor to replace the first fragment reference with a third fragment reference pointing to the second referenced fragment.

89. (Previously Presented) The system of claim 87, wherein the second fragment reference points to a second referenced fragment within the first node, and the decode process further causes the processor to replace the first fragment reference with a third fragment reference pointing to a third referenced fragment within the second node.

90. (Previously Presented) The system of claim 82, wherein the fragment update further comprises a payload.